(c) determining the three-dimensional structure of the targeted RNA, including the position of the critical site relative to the major and minor grooves;

(d) determining the sequence of nucleotides and structure flanking the critical site in the targeted ribonucleic acid that is specific to the critical region of the ribonucleic acid to be inhibited and within the minor groove; and

(e) synthesizing [compounds] a compound that will bind specifically to the critical site within the minor groove of the targeted ribonucleic acid thereby inhibiting targeted ribonucleic acid function.

4. (amended) The method of claim 1 [further comprising synthesizing compounds that inhibit] wherein inhibition of targeted ribonucleic acid function inhibits protein synthesis [from the targeted ribonucleic acid].

5. (amended) The method of claim [1] 4 wherein protein synthesis is inhibited in cells selected from the group consisting of tumor cells, virally infected cells, and [bacteria] bacterial cells.

7. (twice amended) The method of claim 1 wherein the critical region of the targeted ribonucleic acid is determined by mutation of regions of the targeted RNA and [analysis] comparison of the function of the mutated RNA with the original RNA, wherein mutations that result in mutant RNA having altered function indicate that the site of mutation is a critical site.

9. (amended) The method of claim 1 further comprising determining an effective amount of the [inhibitory] compound and combining the [inhibitory] compound with a pharmaceutical carrier.

10. (amended) The method of claim 9 wherein the carrier is selected from the group consisting of [retroviral vectors,] pharmaceutically acceptable compositions for topical administration, pharmaceutically acceptable compositions for parenteral administration, pharmaceutically acceptable compositions for enteral administration, and combinations thereof.

13. (amended) The compound of claim 11 further comprising a pharmaceutically acceptable carrier selected from the group consisting of [retroviral vectors,] pharmaceutically acceptable compositions for topical administration, pharmaceutically acceptable compositions for parenteral administration, pharmaceutically acceptable compositions for enteral administration, and combinations thereof.

20. (new) The method of claim 1 wherein the compound is a nucleic acid and the compound is synthesized *in vivo* from a retroviral vector.

21. (new) The compound of claim 11 wherein the compound is a nucleic acid and the compound is synthesized *in vivo* from a retroviral vector.

Remarks

The present application is directed to a method and compounds for inhibiting RNA function. Compounds are designed that bind to nucleotides exposed on the surface of the